

DECISION MEMO
FOR
BROOK TROUT HABITAT ENHANCEMENT

USDA – Forest Service
Chattahoochee-Oconee National Forest
Habersham and Rabun County
Georgia

I. DECISION

I have decided to implement the Brook Trout Enhancement project which will improve stream habitat conditions along several sections of streams in Habersham and Rabun Counties, Georgia. See project file and/or scoping notice dated September 1, 2006 for maps of the project area. Specifics regarding this decision are as follows:

Brook trout enhancement projects include the following activities: (1) culvert replacements, (2) habitat enhancement, (3) brook trout restoration and (4) brook trout rehabilitation. These projects will be prioritized based on funding and the best chance of success as determined by the interdisciplinary team. Maps of the project areas are available on the internet at <http://www.fs.fed.us/conf/> (under the Forest Planning tab), or may be obtained by contacting the Tallulah Ranger District (see below for phone number).

1. The purpose of culvert replacements is to remove culverts which are currently barriers to brook trout passage. These culverts will be replaced with open arch crossings. Removing these barriers is important to prevent fragmentation of brook trout populations.

Five brook trout streams on the Chattooga and Tallulah Ranger Districts proposed for culvert replacement are: Smith Branch (Totterypole watershed) on FS Road 86C; Bailey Branch (West Fork Chattooga watershed) on FS Road 7; Hannah Branch (Tallulah watershed) on FS Road 163; and both forks of Popcorn Creek (Tallulah) on FS Road 163.

These five culverts are currently barriers and will be replaced with open arch crossings that will not impede or alter stream flows. These open arches will allow and improve fish passage. Two additional culverts are proposed to have baffles installed, Walnut Fork (Warwoman watershed) on FS Road 155 and Ammons (West Fork Chattooga watershed) on FS Road 696. Baffles will be installed in these two existing culverts to provide resting slackwater areas. Without the addition of baffles, these culverts would remain as barriers due to high water velocities through these long pipes. Baffles will slow velocities and provide the fish with the ability to dart from baffle to baffle to allow for passage. All work will be completed in close coordination with the U.S. Fish and Wildlife Service.

2. Habitat enhancement projects will be in partnership with Trout Unlimited. Trout streams that are proposed for habitat enhancement will have the following type of work conducted: deepening pools, constricting the channel to flush sediments, providing cover with rock and/or wood materials and stabilizing stream banks to prevent further erosion.

All projects will also include the assistance of the Georgia Department of Natural Resources and the U.S. Fish and Wildlife Service.

Habitat enhancement work is proposed on seven brook trout streams. These are: Keener and Thomas in the Little Tennessee River watershed; South Fork Moccasin, and Persimmon in the Tallulah watershed; Ammons and Holcomb in the Chattooga River watershed; Bailey Branch in the West Fork of the Chattooga watershed and the upper Chattahoochee River in the Chattahoochee River watershed. Structures will be installed with hand labor and/or motorized equipment. Equipment (rubber tire backhoe, farm tractor or similar equipment) will be used to assist in completing these activities (Standard 11-004). Equipment may only be operated within the stream channel when access is available and will not cause significant stream bank disturbance. Past management experiences have proven that operating heavy equipment within the stream channel not only improves efficiency, but also reduces soil erosion and disturbance that would result from restricting the equipment to operate within the riparian corridor. This knowledge base is accepted across the board with a variety of internal and external hydrologists and biologists (project file.) If equipment is deemed appropriate for the project, suitable routes and egress and ingress sites will be flagged in order to provide minimal disturbance to the riparian area as well as the actual stream bank. Equipment will be washed off site prior to use in order to prevent the spread of invasive species. Any bare soil created by the equipment will be seeded and mulched promptly, within 30 days after completion of the project (per Comment from Georgia Forest Watch, September 29th 2006).

3. Brook trout restoration is proposed for those streams where past comprehensive surveys indicated there were no brook trout present, but with a high potential for creating a successful population. Proposed work will be to stock brook trout into these streams. Brook trout are the only native trout species in Georgia. These stockings will be of the southern strain of brook trout from streams currently containing high and self sustaining numbers.

Addie Branch and Emory are streams within the Chattooga River watershed proposed for future restoration. These streams were sampled in 2003 and 2005 and no fish were found. Emory was resampled in 2005 and very few brook trout were found from the falls downstream of Hale Ridge Road to the next set of falls above the road. An additional stream, Charlie's Creek (upper) was sampled in 2004 and no fish were collected. It is theorized that the possible loss of brook trout populations could have occurred during an extreme storm event or under extreme drought conditions in these high gradient streams. The habitat in these streams is capable of supporting reproducing populations of brook trout. Therefore, brook trout will be collected for stocking from streams where brook trout numbers are high. These fish would be transported to Emory, Addie and Charlie's Creek by hand and released.

4. Brook trout rehabilitation is proposed for those brook trout streams which currently have high densities of native rainbow trout. Rehabilitation will be accomplished by removing the non-native rainbow trout and subsequently stocking brook trout. These

stockings will also be from streams with high numbers of native brook trout. Future rehabilitation is proposed for Holcomb Creek in the Chattooga River watershed. This stream was sampled in the 1980's, and brook trout and rainbow trout were found above the barrier upstream of Hale Ridge road. The rehabilitation work proposed will occur above Holcomb Creek Falls. In this stretch of stream, non-native rainbow trout will be removed. This removal will eliminate the competition with the native brook trout, thus allowing an increase in the brook trout population. Removal will be by the use of electrofishing.

In Tate Branch, Tallulah River watershed, it is proposed to have a current barrier maintained to prevent the encroachment of non-native rainbow and brown trout. Brook trout are not capable of out competing the non-native trout, resulting in a decline in their numbers or in their extirpation from that particular stretch of stream. This work would be completed with hand labor as well as possibly the use of heavy equipment.

II. Purpose and Need for the Project:

This proposal is a result of the "Brook Trout Management Plan", a cooperative plan written by the Georgia Department of Natural Resources and the USDA Forest Service. This plan prioritized work on brook trout streams within each watershed across the Chattahoochee National Forest. The need for this project is also generated by the goals and objectives in the Chattahoochee-Oconee National Forests Land and Resource Management Plan (LRMP, Chapter 2, Goal 26) that addresses the restoration and maintenance of aquatic ecosystems for all native and desired nonnative species of aquatic flora and fauna. Objectives 26.3 and 26.4 specifically address the removal of barriers to fish passage and habitat enhancement for brook trout.

The range of the brook trout has been drastically reduced over the past 100 years due to incompatible land use practices, such as massive clearing of trees, and other human activities which have altered stream morphology. Undoubtedly, this massive disturbance must have had drastic consequences on the hydrology of these mountain streams, primarily due to increased run-off and storm flows. In Georgia, the vast majority of brook trout populations are located on National Forest System lands, thus emphasizing the importance of enhancing existing habitat for this species. The major limiting factor in most headwater brook trout streams in Georgia is the lack of habitat diversity, primarily adult (pool) habitat. Ideally, a stream should have an approximate 1:1 pool/riffle ratio to provide optimum habitat for trout. Currently, these streams and many other Southern Appalachian streams alike suffer from a 1:6 pool/riffle ratio. The need for restoration is based on increasing the existing population of brook trout so they will be better able to withstand any natural catastrophic events, as well as providing a better fishery for Georgia anglers (per Question from Georgia Forest Watch, September 29th, 2006).

All of the activities covered in this decision are needed to improve brook trout dispersal throughout streams, restore brook trout where they no longer exist and to reduce non-native rainbow and brown trout competition among existing brook trout populations. Since it has been proven that brook trout cannot compete with non-native trout species,

the streams proposed for restoration and rehabilitation will no longer be stocked with the above mentioned non-native trout species.

Fish assemblage, population data and temperature data have been collected on several of these streams using thermographs and the Three Pass Depletion Electrofishing sample method. In addition, results of a combined 22 years of data comparing restored brook trout streams against control streams in Jones and Cane Creek indicated increased brook trout abundance and size in restored brook trout streams. This data will continue to be collected in these streams in order to monitor the success of these projects (per comment from Georgia Forest Watch, September 29th, 2006). An adaptive management approach will be utilized to minimize adverse effects or inefficiencies should monitoring data suggest any problems.

III. PUBLIC INVOLVEMENT

On September 1st, 2006, the District mailed a scoping letter requesting comments on the proposal to interested individuals, organizations, and agencies. The comment period closed October 1st, 2006. In addition, several field visits to these sites have been attended by Georgia Department of Natural Resources fisheries biologists as well as U.S. Fish and Wildlife Service biologists.

A total of 7 comments were received from interested individuals, organizations and agencies. Five comments were in support of the above mentioned activities described in this decision. These comments were received from the Rabun Chapter of Trout Unlimited; Georgia Department of Natural Resources, Wildlife Resources Division; Georgia Appalachian Trail Club; Appalachian Trail Conservancy; GA Council of TU and a private citizen. Two groups posed several questions and concerns regarding the above mentioned activities. These questions and comments were received from Georgia ForestWatch and The Rabun County Coalition.

Reasons for Categorically Excluding the Decision:

Decisions may be categorically excluded from documentation in an environmental impact statement or environmental assessment when they are within one of the categories identified by the U.S. Department of Agriculture in 7 CFR part 1b.3 or one of the categories identified by the Chief of the Forest Service in Forest Service Handbook (FSH) 1909.15 sections 31.1b or 31.2, and there are no extraordinary circumstances related to the proposed action that may result in a significant individual or cumulative environmental effect.

Category of Exclusion:

This project clearly falls within the category of exclusions found in Forest Service Handbook 1909.15, chapter 30, section 31.2 (Category 7), Modification or maintenance of stream structures using native materials or normal practices.

Direction provided in Forest Service Handbook *Environmental Policy and Procedures Handbook* 1909.15 (Interim Directive 1909.15-2002-2, effective 08/23/2002) requires the Responsible Official to consider whether extraordinary circumstances related to a proposed action warrant analysis in an EA or EIS. The Interim ID also states that the

mere presence of these resources does not preclude use of a categorical exclusion. This project was analyzed for the following resource conditions (per FSH 1909.15, Section 30.3) and the results are as follows:

A. Federally listed threatened or endangered species or designated critical habitat, species proposed for Federal listing or proposed critical habitat, or Forest Service sensitive species:

All sites have been surveyed by the Zone Wildlife Biologist and/or the Forest Botanist/Ecologist and Forest Fisheries Biologist. It has been determined these actions will have no effect on any Federally Proposed, Endangered or Threatened species and will have no impact on Regional Forester's Sensitive species. Furthermore, these actions will not affect any designated or proposed critical habitat for Federally listed species.

B. Flood plains, wetlands, or municipal watersheds:

The Brook Trout Restoration project will take place within the riparian corridor and stream bed of several streams. Therefore, appropriate equipment travel corridors will be established prior to project implementation in order to avoid significant disturbance in these areas. This project will not have a significant effect on the flood plains, wetlands or municipal watersheds.

C. Congressionally Designated Areas, such as wilderness, wilderness study areas, or national recreation areas:

Three streams proposed for treatment in the original scoping letter were within designated Wilderness Areas (Revised Land Management Prescription 1.A). These streams were Charlie's Creek, Perry Cove Branch and South Fork of Moccasin Creek. Based on this finding, all work on Perry Cove Branch has been eliminated from this decision; habitat enhancement work on the South Fork of Moccasin Creek will be moved outside of the Tray Mountain Wilderness Area (downstream of Forest Service road 26-1); and all brook trout will be stocked in Charlie's Creek by non-motorized means (per comment from Georgia Forest Watch, September 29th, 2006). Therefore, this project will not have an effect on Congressionally Designated Areas, such as wilderness, wilderness study areas, or national recreation areas.

D. Inventoried Roadless Areas:

Seven streams in this decision are within inventoried Roadless Areas. These streams are: Addie Branch, Ammons Creek, Bailey Branch, Emory Creek, Holcomb Creek, Keener Creek and Persimmon Branch. Although they are in inventoried Roadless Areas, they have been allocated to management prescriptions (4.I and 12.A) within the Revised Land Management Plan (2004) which allow the aquatic habitat improvement activities covered in this decision. Management actions will not be taken that result in any inventoried Roadless area no longer meeting Forest Service Roadless criteria.

E. Research Natural Areas:

The project area is not within a research natural area, so there will be no effect on any research natural areas.

F. American Indians and Alaska Native Religious or Cultural Sites:

The project areas were reviewed utilizing the cultural resource atlas and previous heritage survey information. No American Indian religious or cultural sites exist in the project area; therefore no American Indian religious or cultural sites will be affected by this project.

G. Archaeological Sites, or Historic Properties or Areas:

The project areas were reviewed and surveyed by a Forest Service Archeologist. It was determined that project implementation will have no effect on archeological sites, historic properties or areas.

Based on my review of the impacts of these actions, I have determined that there are no extraordinary circumstances associated with the project; there will be no significant impacts to the physical, biological, or social portions of the human environment. The possible effects on the human environment are not highly uncertain nor do they involve unique or unknown risks. The action does not set a precedent for future actions. Because this action falls clearly in a category for exclusion, and because extraordinary circumstances are not present, I have decided that this action can be implemented as described in this Decision Memo without further documentation in an environmental assessment or environmental impact statement.

IV. FINDINGS REQUIRED BY OTHER LAWS

Forest Plan Consistency – The actions in this decision are consistent with the Land and Resource Management Plan for the Chattahoochee-Oconee National Forests.

State approved Best Management Practices (BMP's) will be met and this project will comply with the Clean Water Act.

V. IMPLEMENTATION DATE

Implementation of this decision may begin immediately.

VI. ADMINISTRATIVE REVIEW OR APPEAL OPPORTUNITY

Pursuant to 36 CFR 215.12, this decision is not subject to appeal.

VII. CONTACT PERSON

Records of the environmental analysis are available for public review at the Tallulah Ranger District office. Questions regarding this decision may be addressed to David Jensen, District Ranger, 706-782-3320. Technical questions may be addressed to Mike Brod, East Zone Wildlife Biologist at the same location and phone number.

VIII. RESPONSIBLE OFFICIAL

/s/:David W. Jensen

2/09/2007

David W. Jensen
District Ranger
Tallulah/Chattooga Ranger Districts

DATE: